IN THE CLAIMS:

Claims 1 through 45 were previously canceled herein without prejudice or disclaimer. Claims 47 and 48 are canceled herein. Pending claim 46 is presented below. This claim listing replaces all prior claim listings in the application. Please enter the claim as amended.

Listing of the Claims:

1-45. (Cancelled).

46. (Currently amended) A method for selecting a pig for breeding by identifying a pig having a paternally imprinted quantitative trait locus (QTL) associated with larger muscle mass and/or decreased fat deposition such that when the pig is used in a breeding program, the offspring of the pig that inherit said QTL from the male parent have larger muscle mass and/or decreased fat deposition compared to controls, wherein the ~~identification of the~~ method for selecting a pig comprises:

identifying the presence of the paternally imprinted QTL associated with larger muscle mass and decreased fat deposit by detecting one or more genetic markers selected from the group consisting of genetic markers linked to the ~~paternally imprinted~~ QTL on chromosome 2 of the pig, genetic markers in linkage disequilibrium with the paternally imprinted QTL on chromosome 2 of the pig, ~~genetic markers within the paternally imprinted QTL on chromosome 2 of the pig that represent the actual causal mutation that results in larger muscle mass and/or reduced fat deposition,~~ and combinations of any thereof;

wherein ~~the location of~~ the paternally imprinted QTL ~~is indicated by a genomic region comprising~~ comprises the insulin-like growth factor-2 gene (IGF-2) as well as the genetic markers Swr2516, Swc9, ~~S22623~~ Sw2623, and Swr783 on chromosome 2 of the pig;

wherein the QTL is present on chromosome 2 of the pig at position 2p1.7; and

wherein the identification of the pig having the paternally imprinted QTL associated with larger muscle mass and/or decreased fat deposit selects the pig for breeding.

47. and 48. (Canceled).